ABSTRACT

A valve for automatically and proportionally adjusting fluid flow between an engine and a radiator for cooling the fluid heated by the engine in response to changes in fluid temperature within a range of operating temperatures. The valve includes a housing having a chamber. The housing includes a radiator flow port for passing fluid between the radiator and the chamber, a bypass flow port for passing fluid between the engine and the chamber, and an engine flow port for passing fluid between the chamber and the engine. A vane disposed in the chamber has a vane wall engagable with both the radiator and bypass fluid ports for restricting fluid flow through the radiator and bypass fluid ports. The vane is pivotally coupled to the housing for movement between the radiator and bypass fluid ports. A drive assembly is operatively coupled to the vane for varying the position of the vane within the chamber.